# Teacher-Student Verbal Interaction Patterns At The Tertiary Level Of Education

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## **ABSTRACT**

The main objective of the proposed study was to explore Teacher-Student verbal interaction patterns at tertiary level education in the North West Frontier Province of Pakistan using Flanders' Interaction Analysis system. This study was significant because its findings and conclusions may stimulate teachers to improve their teaching behaviour in order to maximize student learning. To achieve the above study objectives, three hypotheses were formulated in the light of Flanders "Two-thirds rule" of teacher-student classroom interaction at the tertiary level, namely, about two-thirds of the classroom time is devoted to talking, about two-thirds of this time the person talking is the teacher and two-thirds of the teachers' talk is "direct" talk. Twenty-five classrooms at the tertiary level were randomly selected as samples for this study. Twenty-five observations were carried out, one in each classroom, using Flanders Interaction Analysis system to secure the data. To do this, time sampling was used and each classroom was observed for 810 seconds (13.50 minutes) in a 45-minutes class. After obtaining and encoding the data, it was tabulated, analyzed, and interpreted by using percentages, means, and standard deviation. All the hypotheses were supported and it was concluded that, at the tertiary level, more than twothirds of classroom time was devoted to talking. Thus, talk method dominated in classes. More than two-thirds of the classroom talking time was devoted to teachers talking at the tertiary level with the teachers playing the dominant role. More than two-thirds of the teachers' talking time was devoted to direct talk, which showed the direct role of the teacher and indirect role of students at the tertiary level.

## INTRODUCTION

he teaching learning process at the tertiary level is too weak and our classroom environment is totally based on rote memorization. There is no provision for the development of intellectual and thinking skills among students who are given very little time for active participation and interaction. The teacher seems to be in a very dominant role in the class. Unfortunately, the poorly structured classrooms quickly deteriorates into a vacuous waste of time.

Recent research on teaching effectiveness based on large-scale meta-analysis conducted by Walberg (1986) indicates that the seven factors for the key elements of effective teaching are: engaged academic learning time, use of positive reinforcement, cooperative learning activities, positive class atmosphere, higher-order questioning, cues and feedback, and use of advance organizers. The system of interaction developed by Flanders shows how these elements fit together in actual classroom interaction.

Jackson (1968) reports that teachers are typically involved in more than 1,000 verbal exchanges with their students every day. There is a lot of talking; enough to give even the strongest vocal cords a severe case of laryngitis. Count the number of verbal exchanges teachers have with their students and the count during a classroom scene will give an idea of how much teachers talk.

Flanders (1963) originally developed a research tool, namely the Flanders Interaction Analysis (FIA). FIA became a widely used coding system to analyze and improve teaching skills. This observations system was designed to categorize the type and quantity of verbal dialogue in the classroom and to plot the information on a matrix so that it could be analyzed. The result gave a picture of who was talking in a classroom and the kind of talking that was taking place.

As a result of research with his coding instrument, Flanders uncovered the two-thirds rule: about two-thirds of classroom time is devoted to talking. About two-thirds of this time the person talking is the teacher, and two-thirds of the teacher's talk is "direct" (that is, lecturing, giving directions, and controlling students). The two-thirds rule is actually three related rules which serve to substantiate that typically teachers verbally dominate the classroom.

## **Significance Of The Study**

Perhaps few studies have been carried out in Pakistan about Teacher–Student verbal interaction patterns. There is a need to study different patterns of classroom interaction at tertiary educational levels in the light of Flanders interaction analysis system.

The present study was designed to investigate the patterns of classroom interaction tertiary levels in the light of Flanders' Interaction Analysis system in North West Frontier Province of Pakistan. The study was further delimited to cities of Kohat and Peshawar.

# **OBJECTIVES OF THE STUDY.**

The major objective of the study was:

1. To explore Teacher–Student verbal interaction patterns at the tertiary level in the light of Flanders' Interaction Analysis.

# HYPOTHESES OF THE STUDY.

To achieve the above objectives of the study, the following research hypotheses were formulated.

- 1. About two-thirds of classroom time is devoted to talking at the tertiary level.
- 2. About two-thirds of the talking time, the person talking is the teacher at the tertiary level.
- 3. About two-thirds of the teachers' talk is "direct" at the tertiary level.

# **POPULATION**

As the purpose of the study was to explore Teacher–Student verbal interaction patterns at tertiary levels in the light of Flanders' Interaction Analysis, the target population comprised all the tertiary level classrooms in North West Frontier Province of Pakistan.

# Sample

The sample of the study consisted of twenty-five classrooms at the tertiary level. The number of observed teachers was twenty-five. The number of observed students was twelve hundred at the tertiary level. All the twenty-five classes of the above two levels were selected randomly.

# RESEARCH INSTRUMENT

This instrument was developed by Flanders (1970) and has been used extensively in various studies regarding classroom interaction. The items in the Flanders Interaction Analysis were converted in an observation sheet called a coding chart as illustrated by Gay (2000).

#### **Observation Sheet**

1															
2															
3															
4															
5															
6															
7															
8															
9															
10															

Name of Teacher:

Class:

Subject:

The above observational sheet represents 90 seconds for 10 categories of FIA. Each block in the observational sheet represents 3 seconds.

#### **Procedure**

The design of the study was observational. In order to secure data, Flanderss Interaction Analysis procedure was employed to observe classroom interaction patterns in tertiary level classrooms. The following observation procedure was adopted:

- 1. In each class period of 45 minutes, 13.50 minutes (810 seconds) were used as observation period.
- 2. 13.50 minutes (810 seconds) were divided in to nine time units.
- 3. One time unit was 1.30 minute (90 seconds).
- 4. In the first fifteen minutes of the class observation period, three time units were observed randomly, comprising 4.50 minutes (270 seconds).
- 5. In the second fifteen minutes of the class observation period, three time units were observed randomly, comprising 4.50 minutes (270 seconds).
- 6. In the third fifteen minutes of the class observation period, three time units were observed randomly, comprising 4.50 minutes (270 seconds).
- 7. A stopwatch was used together with an ordinary watch.
- 8. Total time for observation in a single classroom comprised 13.50 minutes (810 seconds).

# **Data Collection**

The observational session was an interesting stage for the researcher. He had to visit different classrooms, of different stages with different subject matter and with different teachers. Twenty-five classes (as mentioned in the sample) were observed. The co-operation of the principals, administrative staff, and teachers was commendable.

# **Data Analysis**

Data collected through the above mentioned research instrument were coded in the observation sheets. Each table was analysed and interpreted by using percentages. In order to calculate, all the categories from category

1 to 10 were added and the mean and standard deviation of 10 categories for 25 secondary classes were calculated. In order to calculate the talk time, frequencies from category 1 to 9 were added which were converted into percentages by dividing the frequencies with the total time of interaction. To calculate teachers' talk time, frequencies from category 1 to 7 were added which were converted into percentages by dividing the frequencies with the total talk time. To calculate the teachers' direct talk time, frequencies from category 5 to 7 were added which were converted into percentages by dividing the frequencies with the teachers' talk time.

#### **FINDINGS**

**Research hypothesis # 1:** About two-thirds of classroom time is devoted to talking at the tertiary level.

### Proportion of talk time in classrooms at the tertiary level

No of	Total Talk time in	Mean Talk Time	Observation time per	% age of talk time per
Class-	secondary level classes	(in seconds)	class	class
rooms	(in seconds)		(in seconds)	(in percentage)
25	19195	767.8	810	95*

Table 1 reflects that mean talking time (in percentage) in tertiary level class room was more than two-thirds of the total class time. The statement supports the hypothesis. It was therefore concluded that more than two thirds of the classroom time was used in talking in the observed classrooms.

**Research hypothesis # 2:** About two-thirds of the talking time, the person talking is the teacher at the tertiary level.]

#### Proportion of teacher talking time in classrooms at the secondary level

No of	Talk time in secondary	Mean Talk Time	Observational time per	% age of talk time per
Class-	level classes	(in seconds)	class	class
rooms	(in seconds)		(in seconds)	
25	17307	692.26	767.8	90*

Table 2reflects that mean teachers' talking time (in percentage) in the tertiary level classroom was more than two-thirds of the total class time. The statement supports the hypothesis. It was therefore concluded that more than two thirds of the classroom time was used in teachers talk in the observed classrooms.

**Research hypothesis** # 3: About two-thirds of the teacher's talk is "direct" at the tertiary level.

# Proportion of teacher direct talking time in classrooms at the tertiary level

No of	Talk time in secondary	Mean Talk Time	Observational time per	% age of talk time per
Class-	level classes	(in seconds)	class	class
rooms	(in seconds)		(in seconds)	
25	14574	582.9	692	84*

Table 3 reflects that mean teachers' direct talking time (in percentage) in the tertiary level class room was more than two-thirds of the total class time. The statement supports the hypothesis. It was therefore concluded that more than two thirds of the classroom time was used in teachers' direct talk in the observed classrooms.

# **CONCLUSION**

On the basis of data analysis and findings of the study, the following conclusions were drawn.

- 1. More than two-thirds of classroom time was devoted to talking at the tertiary level.
- 2. More than two-thirds of the talking time was for teachers' talk.
- 3. More than two-thirds of the teacher's talk was direct talk at tertiary level.

# **DISCUSSION**

The results of the study that two-thirds of classroom time was devoted to talking, two-thirds of the talking time was devoted to teachers' talk and two-thirds of teachers' talk was direct talk is in line with formulation of Flanders (1970) who uncovered the two-thirds rule which says that about two-thirds of classroom time is devoted to talking, about two-thirds of the talking time the person talking is the teacher and two-thirds of the teachers' talk is directed talk. The two-thirds rule is actually three related two-thirds rules. The results of the study support the studies by Mark (1994) and Gage (1978) who wanted to examine possible differences according to grade level, secondary versus secondary.

The present conclusions, however, do not provide support to the studies by Steadman and Mary (1993), Amidon  $et\ al\$ . (1967), Bale (1950) and Medley and Hitzel (1963). The deviation of the conclusion from the above studies may be due to the instruments used for interaction analysis.

The basic assumption of the system is that in the classroom, the verbal statements of a teacher are consistent with his nonverbal gestures and his total behaviour.

Similarly, patterns of classroom interaction in tertiary level classes have shown great differences in teachers' talk time. It may be due to the process of observation in the class, where teachers were alert for observation. Bale (1950) and Amidon (1973) did not find the similar patterns of classroom interaction between teacher and student due to the change in the instrument. Had the observations been made unobtrusively, the results would have been different.

Another possible reason for the results might be that it was a just an observation with a small proportion of time. The observation was not based on a standard schedule. As such, its reliability and validity could not be tested. Still another possibility is that total subjects in college and university were taken.

Still another reason might be the flaws in coding procedure used by the researcher about interaction pattern in the classes. Flanders remarked that two-thirds of the classroom time is devoted to talk, about two-thirds of time the person talking is the teacher and two-thirds of the teachers' talk is direct. The results are more than two-thirds in the present study, that is, about 80 % is teachers' talk, 12 % is the students talking, and 8% is silent time. The results of the study also revealed no intercultural differences in interaction.

In the present study, percentages were used for analysis and interpretation. The result might have been different if the ratio between indirect influence and direct influence, ratio between positive and negative reinforcement, steady state cell, and content cross cell, constructive integration cells and vicious cells were used.

In the study, the researcher himself coded the interaction patterns in the sample classrooms. It would have been better if one more observer trained in the coding process were involved in order to determine the inter observer reliability, thus, making the observation more authentic and reliable.

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# **NOTES**